

# Objet30 Prime 3D Printer

## Basic Instructions

### *First Things First*

Firstly, you must turn on the computer and the 3D printer. To turn on the Objet30 Prime simply hit the switch located on the back left of the printer near the cord plug ins. Once the 3D Printer and computer are on, double click on the “Printer Computer” shortcut found on the monitor desktop. This shortcut will connect the computer to the printer. After the computer and printer are connected, double click on the Objet printer icon (or go to Start > All Programs > Objet > Objet) to open the Objet printer interface screen. All monitoring and controlling of the printer is done from this interface.

From the Objet printer interface screen, click “options” from the top toolbar and then hover over “wizards”. There are several wizards that give step by step instructions about how to care for the printer and do various necessary checks on it. For example, a pattern test should always be performed prior to printing. This will test the print heads and make sure they are laying down a smooth pattern for printing. A pink piece of paper is laid on the print tray and then the “pattern test” button is found under the “options” drop-down. If the pattern on the paper is not smooth, the print heads must be cleaned. Instruction for head cleaning can be found under the “wizards” tab. After every print, the print heads, the roller surface, and the print tray must be cleaned.

### *Objet Studio*

If you already have an object file that is ready to be printed, then simply open Objet Studio on the computer. Once the program is open, download the desired file. Objet Studio allows you to adjust the size, color, material type, location of the object on the tray, and will even estimate the time and materials needed for the job. Objet Studio then can send your job to the printer. Objet Studio is very user friendly and is easy to adjust to. If you hover over each button, it will tell you exactly what that button does.

### *3D Builder*

If you intend to create your own object or download a new object, then you need to open 3D Builder on the computer. This program allows you to build your very own object from scratch. 3D Builder also has a good sized library of objects that you can print right away or you can change them to what you desire. Another great aspect of this program is that you can upload files. A great place to find templates is at [thingiverse.com](http://thingiverse.com). This website has a vast number of templates and you can find nearly anything you can image and download it for free. These downloads can also be uploaded directly into Objet Studio, but you won't be able to edit them as much as you can in 3D Builder. Again, this program is very user friendly. Don't be afraid to play around with the objects.

Once you have completed your object on 3D Builder, you will need to save the file in STL format. This is very important! When the file has been saved (in STL format!), open Objet Studio and upload the file. Always be sure to use the buttons found in the “Build Process” tab in the upper left hand corner before printing. The “Placement” button will place your object(s) in the best possible position for the most efficient printing. The “Validate” button makes sure your object(s) is formatted in such a way that the printer will be able to handle it with no problems. The “Estimate” button tells you how much material will be needed as well as how long the print will take. The estimates are found in the rightmost box at the top. Finally, if the previous three buttons have been pressed and the results are as you wish, click the “Build” button to send your job to the printer!

# Objet30 Prime 3D Printer

## Basic Instructions

### *User Guides*

The printer user guide is found at <http://microfluidics.cnsi.ucsb.edu/tools/Objet%2030%20Pro%20printer/30UserGuide.pdf>

If need be, you can find the Objet Studio user guide at <http://microfluidics.cnsi.ucsb.edu/tools/Objet%2030%20Pro%20printer/30UserGuide.pdf>

The 3D Builder user guide can be found at <https://channel9.msdn.com/Blogs/3D-Printing/3D-Builder-User-Manual>